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Figure 1

HSPDE1A	---MGSSATEIEEELNTTFKYLTGEQTEKMWQRKLG1-----LRCLVKQLERGDV	47
HSPDE1B	MELSPPRSPPEMLEESDCPSPLELKSAPSKMMWIKRLSL-----LYRMVQLENGEI	51
HSPDE1C	---MESPTKEIEEFESNSLKYLQPEQIEKIWLRLRGLRKYKTSQRLRLSVKQLERGEA	56
	.. :: : * :*: *:~:	:** :*****:
HSPDE1A	NVVDLKKNIEYAASVLEAVYIDETRLLDTEDELSDIQTDSVPSEVRDWLASTFTTRKMGM	107
HSPDE1B	NIEELKKNLEYTASLLAEVYIDETROILDTEDELQELRSDAVPSEVRDWLASTFTQQARA	111
HSPDE1C	SVVDLKKNLEYAATVLESVYIDETRLLDTEDELSDIQSDAVPSEVRDWLASTFTTRQMGM	116
	.. :*	:
HSPDE1A	TKKKPEEKPKFRSIVHAVQAGIFVERMYRKYHVMGLAYPAAVITLKDVDKWSFDVFAL	167
HSPDE1B	KGRRAEEKPKFRSIVHAVQAGIFVERMRRTYTSGVPTYSTAVLNCLKNLDLWCDFVFSL	171
HSPDE1C	MLRRSDEKPRFKSIVHAVQAGIFVERMYRRTSNMVGLSYPPIAEALKDVDKWSFDVFSL	176
	:...*:*:*:*****:*: ** :~*:~* :*:~* :*****:*	
HSPDE1A	NEASGEHSLKFMIYELFTRYDLINRFKIPVSCLITFAEALEVGYSKYNPYHNLIHAADV	227
HSPDE1B	NQAADDHALRTIVFELLTRHNILSRFKIPTVFLMSFLDALETGYGKYKNPYHNQIHAADV	231
HSPDE1C	NEASGDHALKFIFYELLTRYDLISRFKIPISALVSFVEALEVGYSKHKNPYHNLMHAADV	236
	::~:~* :.:*:~*::*.***** :~* :~* :~* :~* :~* :~* :~* :~* :~* :	
HSPDE1A	TQTVHYIMLHTGIMHWLTEILELAMVFAAAIHDYEHTGTTNNFHIQTRSDDVAILINDRSV	287
HSPDE1B	TQTVHCFLLRGTGMVHCLSEIELLAIFIAAAIIHDYEHTGTTNSFHIQTKECAIVINDRSV	291
HSPDE1C	TQTVHYLLYKTGVANWLTELEIFAIIFSAAIHDYEHTGTTNNFHIQTRSDPAIILINDRSV	296
	***** :.:*:~* : *::~*:~*::*.***** :~* :~* :~* :~* :~* :~* :~* :~* :	
HSPDE1A	LLENHHVSAAYRLMQEEE-MNILINLSKDDWRDLRNLVIEMVLDSTMDSGHFQQIKNIRNSL	346
HSPDE1B	LLENHHISSVFRMLQDDE-MNIFINLTKDEFVELRALVIEMVLATDMSCHFOOVKTMKTAL	350
HSPDE1C	LLENHHLAAYRLLQDDEMNILINLSKDDWREFRTLVIEMVMATDMSCHFOQIKAMKTAL	356
	*****:~* :~* :~* :~* :~* :~* :~* :~* :~* :~* :~* :~* :~* :~* :~* :	
HSPDE1A	QQPEGIDRAKTMSELILHAADISHPAKSWKLHYRWMTALMEEFFLQDGKEAELGLPFSPLC	406
HSPDE1B	QQLERIDKPKALSLLLHAADISHPTAKQWLHVSRWTKALMEEFFRQDGKEAELGLPFSPLC	410
HSPDE1C	QQPEAIEKPKALSMLLHTADISHPAKAWDLHRWMTALMEEFFRQGDREAELGLPFSPLC	416
	** * ~* :~* :~* :~* :~* :~* :~* :~* :~* :~* :~* :~* :~* :~* :~* :	
HSPDE1A	DRKSTMVAQSQIGFIDFIVEPTFSLLTDSTEKIVIPLIEEASKAETS-----SYVASS	459
HSPDE1B	DRTSTLVAQSQIGFIDFIVEPTFSVLTDVAEKSVQPLADEDSKSKNQP----SFQWRQPS	466
HSPDE1C	DRKSTMVAQSQVGFIDFIVEPTFTVLDTMTEKIVSPLIDETSQTGGTGQRRSSLNISISS	476
	~ :~* :~* :~* :~* :~* :~* :~* :~* :~* :~* :~* :~* :~* :~* *	
HSPDE1A	STTIVGLHIA-----DALRRSNTKGSMDSGSYSPTYSLAAVDLKSFKNNL	504
HSPDE1B	LDVEVGDPNP-----DVVSFRSTWVKRIQENKQKWKERAAAGITNQMS--	509
HSPDE1C	DAKRSGVKTSGSEGSAPINNSVISVDYKSFKATWTEVVHINRERWRACKVPKEEKAKKEAE	536
	*	
HSPDE1A	VDIIQONKERWK--ELAAQEARTSSQKCEFIHQ-----	535
HSPDE1B	IDELSPCEEEAP--PSPAEDHNQNGNLD-----	536
HSPDE1C	EKARLAAEEQQKEMEAKSQAEEGASGKA EK K T S G E T K N Q V N G T R A N K S D N P R G K N S K A E K	596
	. :~* :~* :~* :~* :~* :~* :~* :~* :~* :~* :~* :~* :~* :~* :~* :	
HSPDE1A	-----	
HSPDE1B	-----	
HSPDE1C	SSGEQQONGDFDKGNKNTDKKDHNSIGNDSKKTDDSQE	634

Figure 2

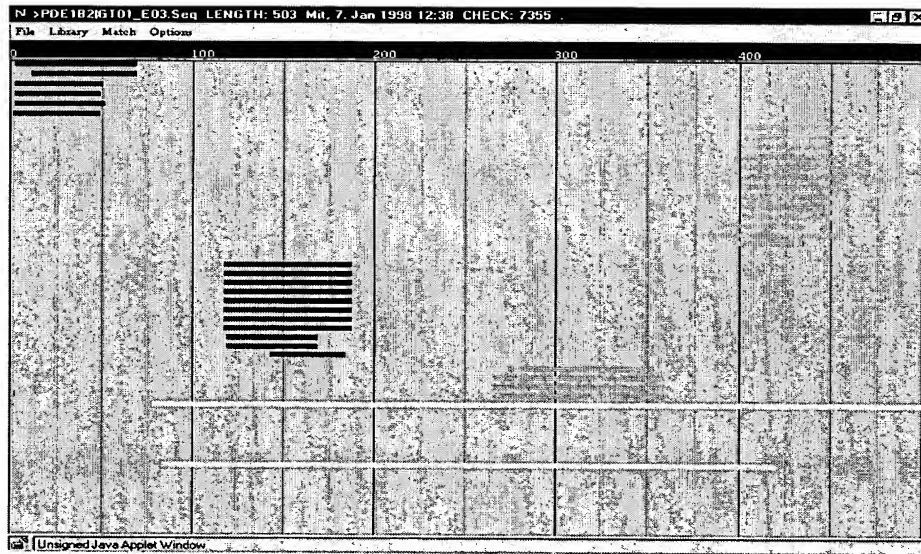


Figure 3

PDE 1A
Subtypes

Bovine



Bovine



Human



Murine



Human



Figure 4A

N-terminal sequences of PDE1A splice variants

PDE1A3_ 1 MGSSATEIEELENTTFKYLTEGEQTEKMWQRLKGILRCLVKQLERGDVNVVDLKKNIEYAA
 PDE1A5_ 1 MDDHVTIRKKHLQRPPIFRLRCLVKQLERGDVNVVDLKKNIEYAA

Figure 4B

N-terminal sequences of PDE1B splice variants

PDE1B1_ 1 MELSPRSPPEMLEESDCPSPLELKSAPSKKMWIKLRSLRYMVKQLENGEINIEELKKNL
 PDE1B2_ 1 MANPVPVQRSHLQGPILRLRYMVKQLENGEINIEELKKNL

Figure 4C

Comparison of the CaM binding domains of the PDE1A1 and PDE1B2 splice variants

PDE1A1 1 MDDHVTIRKKHLQRPPIFRLRCLVKQLEKGDVNVVDLKKN
 PDE1B2 1 MANPVPVQRSHLQGPILRLRYMVKQLENGEINIEELKKN
 * * * * *

Figure 4D

Comparison of the CaM binding domains of the PDE1A2 and PDE1B1 splice variants.

PDE1A2 1 MGSTATETEELNTTFKYLIGEQTAKMWQRLKGILRCLVKQLEKGDVNVVDLKKNIE
 PDE1B1 1 MELSPRSPPEMLEESDCPSPLELKSAPSKKMWIKLRSLRYMVKQLENGEVNIEELKKNLE
 * * * * *

Figure 5

